

Notice of Allowability

Application No.

10/799,891

Examiner

MANSOUR M. SAID

Applicant(s)

MAEHARA, TOSHIO

Art Unit

2629

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address--

All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. **THIS NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS.** This application is subject to withdrawal from issue at the initiative of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

1. ☒ This communication is responsive to 3/28/07.
2. ☒ The allowed claim(s) is/are 1-5.
3. ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some* c) ☐ None of the:
- ☒ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).

* Certified copies not received: _____.

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.

THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

4. ☐ A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
5. ☐ CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
- (a) ☐ including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
- 1) ☐ hereto or 2) ☐ to Paper No./Mail Date _____.
- (b) ☐ including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.
- Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).
6. ☐ DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- ☐ Notice of References Cited (PTO-892)
- ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- ☒ Information Disclosure Statements (PTO/SB/08),
Paper No./Mail Date 3/15/04
- ☐ Examiner's Comment Regarding Requirement for Deposit
of Biological Material

5. ☐ Notice of Informal Patent Application

6. ☐ Interview Summary (PTO-413),
Paper No./Mail Date _____

7. ☐ Examiner's Amendment/Comment

8. ☒ Examiner's Statement of Reasons for Allowance

9. ☐ Other _____


RICHARD HJERPE

SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2800

DETAILED ACTION

Allowable Subject Matter

1. Claims 1-5 are allowed.

The following is an examiner's statement of reasons for allowance: Claims 1-5 are allowed since certain key features of the claimed invention are not taught or fairly suggested by prior art. **In claim 1**, “, “a calculation portion for adding high-order bit pixel data to a value corresponding to the least significant bit digit in said high-order bit pixel data to obtain addition high-order bit pixel data, said high-order bit pixel data being constituted by high-order consecutive bits of said input pixel data; a selection portion for selecting either said addition high-order bit pixel data or said high-order bit pixel data in accordance with a value of low-order bit pixel data, said low-order bit pixel data being constituted by low-order consecutive bits of said input pixel data; and, a D/A conversion portion for performing digital-to-analog conversion of the selected pixel data to obtain said analog image signal”. **In claim 5**, “ D/A conversion portion for performing digital-to-analog conversion processing of high-order bit pixel data comprising high-order consecutive bits in said input pixel data to obtain an analog signal; and a calculation portion for outputting an addition result, as said analog image signal, of said analog signal and a value corresponding to the least significant bit digit in said high-order bit pixel data in accordance with a value of low-order bit pixel data, said low-order bit pixel data being constituted by low-order consecutive M bits (M is a natural number) of said input pixel data, wherein upon image signal processing of said input pixel data contained by each consecutive 2^m frames, said calculation portion outputs said addition result as said analog image signal for frames corresponding in number to a value of said low-order bit pixel data, and outputs said analog signal as said analog image signal for the other frames”. The closest prior art (Kasahara, Koichi, (EP-0458169A2)

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teaches a an active matrix display device comprising a conversion means for receiving digital video signals having m-bit gray scale digits successively and converting them into parallel gray-scale ... during the second period, the least significant bit is added to this (m-1) bit gray scale data at adders in accordance with the lest significant bit of the video data and supplied to decoders and the output from decodes, the voltage having the level corresponding to the output is selected and outputted; however, singularly or in combination with other prior art, fail to anticipate or render the above underlined limitations obvious.

2. Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

Conclusion

3. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Mansour M. Said whose telephone number is 571-272-7679. The examiner can normally be reached on Monday through Thursday from 8:30-6:00 P.M. The examiner can also be reached on alternate Friday from 8:30 a.m. to 5:00 p.m. EST. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Richard A. Hjerpe whose telephone number is 571-272-7681.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

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Washington, D.C. 20231


or faxed to: 571-273-8300 (for Technology Center 2600 only)

Hand-delivered responses should be brought to the Customer Service Window at the Randolph Building, 401, Dulany Street, Alexandria, VA 22314.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Mansour M. Said

4/13/07



RICHARD HJERPE
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 2600